



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/689,362	10/20/2003	Yasushi Toda	17128	4392
23389 7590 08/12/2008 SCULLY SCOTT MURPHY & PRESSER, PC 400 GARDEN CITY PLAZA SUITE 300 GARDEN CITY, NY 11530				
EXAMINER				
WU, JIANYE				
ART UNIT		PAPER NUMBER		
2616				
MAIL DATE		DELIVERY MODE		
08/12/2008		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/689,362

Applicant(s)

TODA, YASUSHI

Examiner

Jianye Wu

Art Unit

2616

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 15 July 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-5 and 8-30 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) 1-5 and 8-21 is/are allowed.
- 6) ☒ Claim(s) 22-30 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-8508)
- 4) ☐ Interview Summary (PTO-413)
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____
- Paper No(s)/Mail Date _____

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/31/08 has been entered.

Response to Arguments/Amendments

2. Applicant's arguments filed 7/15/08 have been fully considered. The arguments are moot due to the fact that all independent claims are amended.

Specification Objections

3. Specification is objected because of minor formalities. More specifically, [0017] is the duplication of [0016], [0019] is the duplication of [0018], [0028] is the duplication of [0026], and [0029] is the duplication of [0028].

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

5. **Claims 22-25, 27-30** are rejected under 35 U.S.C. 103(a) as being unpatentable over "UMTS RRC Protocol specification", V4.0.0.0, 2003-03 (hereinafter 3GPP331) in view of Wright et al (US 2002/0044014 A1, hereinafter Wright).

For **Claim 22-24** and **27**, 3GPP331 discloses a data communication method in a communication system comprising a transmitting side and a receiving side data communication terminal device (UE, Fig. 2, Page 30) each having a communication function adopting a code division multiple access (CDMA) system (the UE implanting cdma2000, Section 8.3.7.3, page 149), wherein:

a coding function part (DCFE in Fig. 2, Page 30; or 4th item of Section 4.2, Page 29) in the transmitting side data communication terminal device and a decoding function part in the receiving side data communication terminal device calculate ("UE shall perform decoding ...", Line 4 of Section 8.1.1.1.4, Page 42, notice that decoding involves calculating), in calculating processes, parameters necessary for a coding and a decoding process in the coding and decoding (codes used coding and decoding in CDMA) function parts (means for generating the codes in UE, Fig. 2, Page 30), respectively, according to designated transport format utilization frequency data (the data of the bandwidth of specified frequency used for CDMA channel).

3GPP331 does not explicitly teach the coding and decoding function parts hold the calculated parameters in their own storage function parts, and for high utilization frequency parameters the coding and decoding function parts read out and utilize parameters held in the storage function parts without doing re-calculation, thus reducing power consumption necessary for calculation.

Wright discloses a non-volatile memory for storing parameters ("parameter are held in non-volatile memory", [0129]), including high utilization frequency parameters. One of advantages of storing parameters in a memory is to avoid doing re-calculation of these parameters for the saving of power ("power is switched off", [0129], but the value is still saved) and for the fast access ("rapid switches", [0294]).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to modify 3GPP331 to include non-volatile memory for storing process parameters as disclosed by Wright or the benefit of saving power and fast accessing to the parameters.

For claims **28-30**, they are the computer corresponding computer readable medium claims of claims 22-24 as disclosed by 3GPP331 in view of Wright.

3GPP331 does not disclose computer readable medium.

Wright discloses computer readable medium (non-volatile memory, [0129]) that can be used to store instructions for implementing the method of claim 22-24.

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to modify 3GPP331 to include non-volatile memory for storing

process parameters as disclosed by Wright for the benefit of saving power and fast accessing to the parameters.

As to **claim 25**, 3GPP331 in view of Wright discloses claims 23 and 24, 3GPP331 further discloses the updating of the parameter data held in the storage function part and the utilization frequency are managed, and the presence/absence data of discrete control channel (DCCH, Section 7.2.2.2, line 3, page 35) data and the transport format combination indicator (TFCI) (*TFCI range method*, Section 10.3.5.14, Page 371) as a combination of the maximum and minimum ones of discrete traffic channel transport formats (DTCH, , Section 7.2.2.2, line 3, page 35) are stored.

3GPP331 in view of Wright is silent on HCCH data and TFCI for DTCH are preferentially stored in the storage function part, while the remainder of the pertinent parameters of the other TFCIs are selectively stored according to the utilization frequency thereof.

However, the concept and advantage of storing different data in different places according to their priority or other criterions are well known in the art (such as cash memory and main memory mechanism widely used in the computer system), Examiner takes an official notice with this notion.

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to preferentially store HCCH data and TFCI for DTCH in the storage function part, and the remainder of the pertinent parameters of the other TFCIs are selectively stored according to the utilization frequency for the benefit of achieving optimal performance.

Claim 26 are rejected under 35 U.S.C. 103(a) as being unpatentable over 3GPP331) in view of Wright, further in view of Akamine et al (US 2003/0064696 A1, hereinafter Akamine).

As to **claim 26**, 3GPP331 in view of Wright discloses claims 23 to 24, but is silent on the preference rank of the parameter to be applied is updated according to the transport rate control data or a receiving sensitivity data given from the network.

In the same field of endeavor, Akamine teaches selecting parameter based on receiving sensitivity ("These assumed values are based on the minimum receiving sensitivity", [0109]).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to modify the method disclosed by 3GPP331 and Wright using the way of selecting parameters based on receiving sensitivity for the benefit of achieving optimal performance.

Allowable Subject Matter

6. Claims 1-5 and 8-21 are allowed.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jianye Wu whose telephone number is (571)270-1665. The examiner can normally be reached on Monday to Thursday, 8am to 7pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Seema Rao can be reached on (571)272-3174. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Jianye Wu/
Examiner, Art Unit 2616

/Kevin C. Harper/
Primary Examiner, Art Unit 2616